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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/715,332	11/17/2003	Junichi Ito	OOCL-144 (US-P1880)	2393
26479	7590	07/31/2007		
STRAUB & POKOTYLO 620 TINTON AVENUE BLDG. B, 2ND FLOOR TINTON FALLS, NJ 07724			EXAMINER KHOKHAR, ASIF I	
			ART UNIT 2609	PAPER NUMBER
			MAIL DATE 07/31/2007	DELIVERY MODE PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/715,332

Applicant(s)

ITO ET AL.

Examiner

Asif Khokhar

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 03 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-31 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-31 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 17 November 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date ____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: ____.

DETAILED ACTION

Priority

1. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

Specification

2. The abstract of the disclosure is objected to because the abstract should not exceed 15 lines of text. Correction is required. See MPEP § 608.01(b).

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claim(s) 1-5, 11-14, 20-23,29 are rejected under 35 U.S.C. 103(a) as being unpatentable over Tamura et al US6771896 in view of Sobol US 20020071035.

With reference to claim 1, Tamura '896 discloses A print system formed of a digital camera and a printer (home printing system, column 6, line 61, Fig.9), each including control means for controlling operations thereof, functionally connected one to another (the printing apparatus is equipped with a receiving means which receives order information from the electronic camera, a printing means which makes prints based on the received order information, a display means which displays information, and a control means which generates order receiving information based on the received order information and makes the display means to

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display the order receiving information, column 3, line 32; This control means is for printer; The electronic camera is equipped with a control means which controls various operations, column 5, line 28; As shown in Fig. 9, camera and printer are functionally connected one to another); wherein the digital camera has a configuration wherein the data forming an image which is to be printed with the printer can be supplied to the printer (an electronic camera itself has a function to prepare information needed for printing images and further a transmitting means which makes image information and print information to be corresponded each other to transmit, column 2, line 30), a secondary battery, which is a power source thereof, can be charged by receiving electric power supplied from the printer (internal power supply of an electronic camera, column 2, line 15; furthermore, it is possible to supply the power from printer 250 to the electronic camera 100 through AC adapter 103, column 17, line 9) , and the state of each function including the state of the secondary battery can be displayed on a predetermined display unit, under control of the control means thereof(The electronic camera is equipped with a control means which controls various operations, column 5, line 28; As shown in Fig. 9; furthermore, The state information is considered to be any one of the following items or a combination of the following plural items. Information about the presence of connection with external power supply, Information about battery types (manganese cell, alkaline cell, nickel-cadmium battery, nickel-hydrogen battery and lithium battery), Information about the number of batteries, Information about the residual capacity of batteries, column 13, line 46; moreover, various kinds of information can also be displayed on the image display section 18, in addition to images, column 7, line 50) ; and wherein the printer has a configuration wherein an image can be printed based upon the image data supplied from the digital camera (Printer 250 is arranged so that images are

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printed on photographic paper P by a printing head when image data transmitted from transmitter-receiver section 40 of electronic camera 100, column 16, line 64), and electric power can be supplied to the digital camera so as to charge the secondary battery thereof, under control of the control means thereof (it is possible to supply the power from printer 250 to the electronic camera 100 through AC adapter 103, column 17, line 9); and wherein the digital camera has a configuration wherein in the event that the digital camera and the printer are functionally connected one to another (Fig. 9), a display is displayed on a predetermined display unit thereof for notifying the state of the secondary battery (various kinds of information can also be displayed on the image display section 18, in addition to images, column 7, line 50; furthermore, The state information is considered to be any one of the following items or a combination of the following plural items. Information about the presence of connection with external power supply, Information about battery types (manganese cell, alkaline cell, nickel-cadmium battery, nickel-hydrogen battery and lithium battery), Information about the number of batteries, Information about the residual capacity of batteries, column 13, line 46), but Tamura '896 does not disclose that a secondary battery, which is a power source thereof, can be charged by receiving electric power supplied from the printer.

Sobol '035 disclose that the printer provides power to the imaging device to operate its processors and to recharge its batteries, abstract. If a camera battery will be recharged by printer power supply, it will eliminate any interruption in communication such as printing. Camera will not be shut down due to no power. It will save a user time to not separately charge the camera and printing job will be done with out any interruption from camera.

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Therefore, it would have been obvious to one of ordinary skill in the art at the time of invention to improve Tamura '896 invention in view of Sobol teaching in order to recharge the camera secondary battery via printer power supply because it will save a user time to not separately charge the camera and printing job will be done without any interruption from camera.

With reference to claim 2, Tamura '896 discloses that in the event that a display is displayed on the predetermined display unit of the digital camera for notifying the state of the secondary battery under control of the control means thereof, and a predetermined operation for preparation for printing an image has been received under control of the control means of the digital camera, the display unit is switched to the mode for displaying the corresponding image (In FIG. 9, electronic camera 100 has functions shown on a block diagram in FIG. 1, and is equipped with image display section 18, print information inputting section 32, battery residual power display section 35 and printer state display section 36. The image display section 18 displays a subject when photographing, and in addition, it can display prepared print information when inputting and preparing the print information, column 16, line 53; It displays an image when an image instruction is executed for an image.)

With reference to claim 3, Tamura '896 discloses that the predetermined operation for preparation for printing the image includes an operation for selecting an image which is to be printed under control of the control means (In this case, selecting buttons 32b and 32c are used for the selection of items, and determination button 32d is pressed down when each item is

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determined, column9, line 66; it same as an operation for selecting an image which is to be printed).

With reference to claim 4, Tamura '896 discloses that the display for notifying the state of the secondary battery (Fig. 11-c and 12) displays the remaining battery power of the secondary battery (information about the residual capacity of batteries. Column 13, line 57), necessity of charging (information about consumed power, column 13, line 63), an estimated value of charging time, or the like (information about the operatable time, column 13, line 67), under control of the control means (it is possible that main microcomputer 8 generates state information about the state of an electronic camera, column 13, line 38.)

With reference to claim 5, Tamura '896 discloses an image, which is to be printed, or which is a candidate to be printed, is displayed on a predetermined display unit of the digital camera as a main display with a relatively large size, under control of the control means (The image display section 18 displays a subject when photographing, and in addition, it can display prepared print information when inputting and preparing the print information, column 16, line 60; As shown in Fig. 9, an image which is to be printed is displayed as a main display with a relatively large size.)

With reference to claim 11, Tamura '896 discloses a print system formed of a digital camera and a printer, each including control means for controlling operations thereof, functionally connected one to another(the printing apparatus is equipped with a receiving means

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which receives order information from the electronic camera, a printing means which makes prints based on the received order information, a display means which displays information, and a control means which generates order receiving information based on the received order information and makes the display means to display the order receiving information, column 3, line 32; This control means is for printer; The electronic camera is equipped with a control means which controls various operations, column 5, line 28; As shown in Fig. 9, camera and printer are functionally connected one to another), wherein the digital camera includes: image data transmitting means for supplying the image data forming an image which is to be printed with the printer, of the image data acquired by the image-taking means, to the printer, under control of the control means thereof and the control means of the printer, communicating with each other (A printing system equipped with an electronic camera which prepares digital image information and with a printing apparatus which receives order information from the electronic camera to conduct printing, wherein the electronic camera to conduct printing, wherein the electronic camera is equipped with a print information providing means which generates order information by providing print information corresponded to the digital image information and with a transmitting-receiving means which conducts transmission and receiving of data, column 3, line 23; Image data is transmitting from camera to printer and printer and camera having communication with each other); a charging circuit for charging a secondary battery employed as a power source thereof by receiving electric power supplied from the printer (It is possible to supply the power from printer 250 to the electronic camera 100 through AC adapter 103, column 17, line 9); a battery monitoring circuit unit for detecting and monitoring the state of the secondary battery, and supplying the detected data to the control means of the digital camera(

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Fig. 11 a- 11c display state of the secondary battery, furthermore the foregoing is an example wherein the state of an internal power supply in an electronic camera can be confirmed on the display section of the electronic camera by a user, column 17, line 57); display means for displaying the state of each function including the state of the secondary battery on a predetermined display unit under control of the control means of the digital camera(Image display section 18, fig 9); and an operation unit for receiving operations performed by the user(information inputting section 32, column 17, line 9); and wherein the printer includes: image data receiving means for receiving image data supplied from the digital camera, under control of the control means thereof and the control means of the digital camera, communicating with each other (A printing system equipped with an electronic camera which prepares digital image information and with a printing apparatus which receives order information from the electronic camera to conduct printing, wherein the electronic camera to conduct printing, wherein the electronic camera is equipped with a print information providing means which generates order information by providing print information corresponded to the digital image information and with a transmitting-receiving means which conducts transmission and receiving of data, column 3, line 23; Image data is transmitting from camera to printer and printer and camera having communication with each other); printing means having a configuration wherein an image can be printed based upon the received image data (Printer 250 is arranged so that images are printed on photographic paper P by a printing head when image data transmitted from transmitter-receiver section 40 of electronic camera 100 are received from communication interface section 256, column 16, line 64); and an electric power supply circuit having a configuration wherein electric power can be supplied to the digital camera so as to charge the secondary battery(It is possible to

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supply the power from printer 250 to the electronic camera 100 through AC adapter 103, column 17, line 9); and wherein the digital camera has a configuration wherein the information with regard to the state of the secondary battery detected and acquired by the battery monitoring circuit unit at the time of the start of the print system is displayed on the display unit under control of the control means thereof (Fig. 11a – 11c), but Tamura '896 does not disclose that a secondary battery, which is a power source thereof, can be charged by receiving electric power supplied from the printer.

Sobol discloses that the printer provides power to the imaging device to operate its processors and to recharge its batteries, abstract. If a camera battery will be recharged by printer power supply, it will eliminate any interruption in communication such as printing. Camera will not be shut down due to no power. It will save a user time to not separately charge the camera and not losing any data while printing.

Therefore, it would have been obvious to one of skill in the art at the time of invention to improve Tamura '896 invention in view of Sobol teaching in order to recharge the camera secondary battery via printer power supply because It will save a user time to not separately charge the camera and printing job will be done without any interruption from camera.

With reference to claim 12, Tamura "896 discloses the digital camera has a configuration wherein in the event that the state of the secondary battery is displayed on the display unit thereof, and the user performs a predetermined operation in preparation for printing an image for the operation unit, the display on the display unit is switched to the mode for displaying the corresponding image, under control of the control means of the digital camera (In FIG. 9,

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electronic camera 100 has functions shown on a block diagram in FIG. 1, and is equipped with image display section 18, print information inputting section 32, battery residual power display section 35 and printer state display section 36. The image display section 18 displays a subject when photographing, and in addition, it can display prepared print information when inputting and preparing the print information, column 16, line 53; It displays an image when an image instruction executed for an image.)

With reference to claim 13, Tamura “896 discloses that the predetermined operation for the operation unit in preparation for printing the image is to be recognized as being a predetermined operation for selecting an image which is to be printed under control of the control means (In this case, selecting buttons 32b and 32c are used for the selection of items, and determination button 32d is pressed down when each item is determined, column9, line 66; it same as an operation for selecting an image which is to be printed.)

With reference to claim 14, Tamura “896 discloses that the digital camera displays the remaining battery power of the secondary battery (information about the residual capacity of batteries. Column 13, line 57), necessity of charging (information about consumed power, column 13, line 63), estimated value of charging time, or the like (information about the operatable time, column 13, line 67), based upon the information with regard to the state of the secondary battery detected and obtained by the battery monitoring circuit, under control of the control means (Fig. 11-c and 12).

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With reference to claim 20, Tamura "896 discloses a digital camera employed for a print system formed of the digital camera and a printer, each including control means for controlling operations thereof, functionally connected one to another (the printing apparatus is equipped with a receiving means which receives order information from the electronic camera, a printing means which makes prints based on the received order information, a display means which displays information, and a control means which generates order receiving information based on the received order information and makes the display means to display the order receiving information, column 3, line 32; This control means is for printer; The electronic camera is equipped with a control means which controls various operations, column 5, line 28; As shown in Fig. 9, camera and printer are functionally connected one to another), the digital camera which comprises image taking means for obtaining image data corresponding to the subject (an image pickup means which receives optical images concerning a subject, column 2, line 21); image data transmitting means for supplying the image data forming an image which is to be printed with the printer, of the image data acquired by the image-taking means, to the printer, under control of the control means thereof and the control means of the printer, communicating with each other (A printing system equipped with an electronic camera which prepares digital image information and with a printing apparatus which receives order information from the electronic camera to conduct printing, wherein the electronic camera to conduct printing, wherein the electronic camera is equipped with a print information providing means which generates order information by providing print information corresponded to the digital image information and with a transmitting-receiving means which conducts transmission and receiving of data, column 3, line 23; Image data is transmitting from camera to printer and printer and camera having

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communication with each other); a charging circuit for charging a secondary battery employed as a power source thereof by receiving electric power supplied from the printer (It is possible to supply the power from printer 250 to the electronic camera 100 through AC adapter 103, column 17, line 9); a battery monitoring circuit unit for detecting and monitoring the state of the secondary battery, and supplying the detected data to the control means thereof (Fig. 11 a- 11c display state of the secondary battery, furthermore the foregoing is an example wherein the state of an internal power supply in an electronic camera can be confirmed on the display section of the electronic camera by a user, column 17, line 57); display means for displaying the state of each function including the state of the secondary battery on a predetermined display unit under control of the control means thereof (Fig. 11a-c); and an operation unit for receiving operations performed by the user (Image display section 18, fig 9.), but Tamura '896 does not disclose that a secondary battery, which is a power source thereof, can be charged by receiving electric power supplied from the printer.

Sobol disclose that the printer provides power to the imaging device to operate its processors and to recharge its batteries, abstract. If a camera battery will be recharged by printer power supply, it will eliminate any interruption in communication such as printing. Camera will not be shut down due to no power. It will save a user time to not separately charge the camera and not losing any data while printing.

Therefore, it would have been obvious to one of skill in the art at the time of invention to improve Tamura ' 896 invention in view of Sobol teaching in order to recharge the camera secondary battery via printer power supply because It will save a user time to not separately charge the camera and printing job will be done with out any interruption from camera.

With reference to claim 21, Tamura '896 discloses that in the event that a display is displayed on the predetermined display unit of the digital camera for notifying the state of the secondary battery under control of the control means thereof, and a predetermined operation for preparation for printing an image has been received under control of the control means of the digital camera, the display unit is switched to the mode for displaying the corresponding image (In FIG. 9, electronic camera 100 has functions shown on a block diagram in FIG. 1, and is equipped with image display section 18, print information inputting section 32, battery residual power display section 35 and printer state display section 36. The image display section 18 displays a subject when photographing, and in addition, it can display prepared print information when inputting and preparing the print information, column 16, line 53; It displays an image when an image instruction executed for an image.)

With reference to claim 22, Tamura '896 discloses that the predetermined operation for preparation for printing the image includes an operation for selecting an image which is to be printed under control of the control means (In this case, selecting buttons 32b and 32c are used for the selection of items, and determination button 32d is pressed down when each item is determined, column 9, line 66; it same as an operation for selecting an image which is to be printed).

With reference to claim 23, Tamura '896 discloses that the display for notifying the state of the secondary battery (Fig. 11-c and 12) displays the remaining battery power of the

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secondary battery (information about the residual capacity of batteries. Column 13, line 57), necessity of charging (information about consumed power, column 13, line 63), an estimated value of charging time, or the like (information about the operatable time, column 13, line 67), under control of the control means (it is possible that main microcomputer 8 generates state information about the state of an electronic camera, column 13, line 38.)

With reference to claim 29, Tamura '896 discloses a digital camera and the printer, each including control means for controlling operations thereof, functionally connected one to another (the printing apparatus is equipped with a receiving means which receives order information from the electronic camera, a printing means which makes prints based on the received order information, a display means which displays information, and a control means which generates order receiving information based on the received order information and makes the display means to display the order receiving information, column 3, line 32; This control means is for printer; The electronic camera is equipped with a control means which controls various operations, column 5, line 28; As shown in Fig. 9, camera and printer are functionally connected one to another), the printer comprises image data receiving means for receiving the image data supplied from the digital camera (A printing system equipped with an electronic camera which prepares digital image information and with a printing apparatus which receives order information from the electronic camera to conduct printing, column 3, line 23); printing means having a configuration wherein an image can be printed based upon the received image data (A printing system equipped with an electronic camera which prepares digital image information and with a printing apparatus which receives order information from the electronic camera to

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conduct printing, wherein the electronic camera to conduct printing, wherein the electronic camera is equipped with a print information providing means which generates order information by providing print information corresponded to the digital image information and with a transmitting-receiving means which conducts transmission and receiving of data, column 3, line 23); and an electric power supply circuit having a configuration wherein electric power can be supplied to the digital camera so as to charge the secondary battery employed in the digital camera (It is possible to supply the power from printer 250 to the electronic camera 100 through AC adapter 103, column 17, line 9), but Tamura '896 does not disclose that a secondary battery, which is a power source thereof, can be charged by receiving electric power supplied from the printer.

Sobol discloses that the printer provides power to the imaging device to operate its processors and to recharge its batteries, abstract. If a camera battery will be recharged by printer power supply, it will eliminate any interruption in communication such as printing. Camera will not be shut down due to no power. It will save a user time to not separately charge the camera and not losing any data while printing.

Therefore, it would have been obvious to one skill in the art at the time of invention to improve Tamura '896 invention in view of Sobol teaching in order to recharge the camera secondary battery via printer power supply because It will save a user time to not separately charge the camera and printing job will be done with out any interruption from camera.

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Claim(s) 6, 15, 24 are rejected under 35 U.S.C. 103(a) as being unpatentable over Tamura et al US6771896 in view of Sobol US 20020071035 in further view of Sato US 6515704.

Q With reference to claim 6, Tamura '896 ^{in view} and Sobol '035 disclose a first display arrangement wherein an image which is to be printed, or which is a candidate to be printed, is displayed as a main display with a relatively large size, and a display for notifying the state of the secondary battery is displayed as a sub-display with a relatively small size, on the same screen on the predetermined display unit of the digital camera (fig. 9), but he does not disclose a second display arrangement wherein a display for notifying the state of the secondary battery is displayed as a main display with a relatively large size, and an image which is to be printed, or which is a candidate to be printed, is displayed as a sub-display with a relatively small size, on the same screen, are freely selected by the user, under control of the control means.

Sato '704 discloses FIG. 2 is a view showing a display layout example of the display section 9. Referring to FIG. 2, reference numeral 100 denotes an actual entire display screen of the display section 9, which is constituted by, e.g., an LCD; 101, a main image display portion as a window at the center of the screen, on which a photographing preview image is mainly displayed; and 102 to 113, a plurality of subwindows at the peripheral portion of the screen, column 4, line 32. Notify a user status of battery, as a main image will gain immediate attention. A user can make appropriate precautions to not letting the printing interruption.

It would be obvious to one skill in the art to implement Sato '704 teaching into Tamura '896 invention in view of Sobol '035 for a second display arrangement wherein a display for

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notifying the state of the secondary battery is displayed as a main display. A user can make appropriate precautions to not letting the printing interruption.

With reference to claim 15, Tamura '896 in view of Sobol '035 disclose a first display arrangement wherein an image which is to be printed, or which is a candidate to be printed, is displayed as a main display with a relatively large size, and a display for notifying the state of the secondary battery is displayed as a sub-display with a relatively small size, on the same screen on the predetermined display unit of the digital camera (fig. 9), but Tamura '896 in view of Sobol '035 does not disclose a second display arrangement wherein a display for notifying the state of the secondary battery is displayed as a main display with a relatively large size, and an image which is to be printed, or which is a candidate to be printed, is displayed as a sub-display with a relatively small size, on the same screen, are freely selected by the user, under control of the control means.

Sato '704 discloses FIG. 2 is a view showing a display layout example of the display section 9. Referring to FIG. 2, reference numeral 100 denotes an actual entire display screen of the display section 9, which is constituted by, e.g., an LCD; 101, a main image display portion as a window at the center of the screen, on which a photographing preview image is mainly displayed; and 102 to 113, a plurality of subwindows at the peripheral portion of the screen, column 4, line 32. Notify a user status of battery, as a main image will gain immediate attention. A user can make appropriate precautions to not letting the printing interruption.

Therefore, it would be obvious to one skill in the art to implement Sato '704 teaching into Tamura '896 invention in view of Sobol '035 for a second display arrangement wherein a

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display for notifying the state of the secondary battery is displayed as a main display because a user can make appropriate precautions to not letting the printing interruption.

With reference to claim 24, Tamura '896 in view of Sobol '035 disclose a first display arrangement wherein an image which is to be printed, or which is a candidate to be printed, is displayed as a main display with a relatively large size, and a display for notifying the state of the secondary battery is displayed as a sub-display with a relatively small size, on the same screen on the predetermined display unit of the digital camera (fig. 9), but Tamura '896 in view of Sobol '035 does not disclose a second display arrangement wherein a display for notifying the state of the secondary battery is displayed as a main display with a relatively large size, and an image which is to be printed, or which is a candidate to be printed, is displayed as a sub-display with a relatively small size, on the same screen, are freely selected by the user, under control of the control means.

Sato'704 discloses FIG. 2 is a view showing a display layout example of the display section 9. Referring to FIG. 2, reference numeral 100 denotes an actual entire display screen of the display section 9, which is constituted by, e.g., an LCD; 101, a main image display portion as a window at the center of the screen, on which a photographing preview image is mainly displayed; and 102 to 113, a plurality of subwindows at the peripheral portion of the screen, column 4, line32. Notify a user status of battery, as a main image will gain immediate attention. A user can make appropriate precautions to not letting the printing interruption.

Therefore, it would be obvious to one skill in the art to implement Sato '704 teaching into Tamura '896 invention in view of Sobol '035 for a second display arrangement wherein a

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display for notifying the state of the secondary battery is displayed as a main display. A user can make appropriate precautions to not letting the printing interruption.

Claim(s) 7-9, 16-18, 25-27 are rejected under 35 U.S.C. 103(a) as being unpatentable over Tamura et al US6771896 in view Sobol US 20020071035 further view of Sato US 6515704 and Anderson 6001436.

With reference to claim 7, Tamura '896 in view of Sobol '035 and further view of Sato '704 disclose a display performed for notify the state of secondary battery, as described above in claim 6, but did not disclose that if the user performs no operation for the digital camera for a predetermined first period of time or more, the display is turned off, under control of the control means.

Anderson '436 discloses a digital camera with the ability to automatically place the digital camera in a sleep mode during the interval when the camera is inactive, column 2, line 63. The sleep mode minimizes power consumption during inactive periods. A user can use a camera for a longer time if sleep mode if available.

Therefore, it would be obvious to one skill in the art to implement Anderson '436 teaching into Tamura '896 invention in view of Sobol '035 and further view of Sato '704 to put the camera in sleep mode, which turns off the display if no operation is perform by a user after a set time. A user can use a camera for a longer time if sleep mode if available.

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With reference to claim 8, Tamura '896 in view of Sobol '035 and further view of Sato '704 discloses that a display is performed for an image, which is to be printed, or which is a candidate to be printed, on the predetermined display unit of the digital camera. But they does not disclose that the user performs no operation for the digital camera for a predetermined second period of time or more, the display is turned off, under control of the control means.

Anderson '436 discloses a digital camera with the ability to automatically place the digital camera in a sleep mode during the interval when the camera is inactive, column 2, line 63. The sleep mode minimizes power consumption during inactive periods. A user can use a camera for a longer time if sleep mode if available.

Therefore, it would be obvious to one skill in the art to implement Anderson '436 teaching into Tamura '896 invention in view of Sobol '035 and further view of Sato '704 to put the camera in sleep mode, which turns off the display if no operation is perform by a user after a set time. A user can use a camera for a longer time if sleep mode if available.

With reference to claim 9, Tamura '896 in view of Sobol '035 and further view of Sato '704 discloses that a display is perform for an image which is to be printed on the display unit of the digital camera (see Tamura '896, fig. 9). But Tamura '896 in view of Sobol '035 and further view of Sato '704 did not disclose that in the event the secondary battery is not being presently charged, the display is turned off, and on the other hand, in the event that the secondary battery is being presently charged, the display is automatically switched to a display for notifying the state of the secondary battery, and furthermore, in the event that the display is performed for notifying the state of the secondary battery due to the switching, and the user performs no operation for the

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digital camera for a predetermined first period of time or more, the display is turned off, under control of the control means.

Anderson '436 discloses a digital camera with the ability to automatically place the digital camera in a sleep mode during the interval when the camera is inactive, column 2, line 63. This sleep mode is performed in the event of battery not being charged, and in the event battery being charged and display for notifying the state the battery and user performs no operation for the digital camera, as described above in claim 7-8. The sleep mode minimizes power consumption during inactive periods. A user can use a camera for a longer time if sleep mode is available.

Therefore, It would be obvious to one skill in the art to implement Anderson '436 teaching into Tamura '896 invention in view of Sato' 704 and Sobol to put the camera in sleep mode, which turns off the display if no operation is performed by a user after a set time. A user can use a camera for a longer time if sleep mode is available.

With reference to claim 16, Tamura '896 in view of Sobol '035 and further view of Sato '704 discloses a display performed for notify the state of secondary battery, as described above in claim 6, but Tamura '896 did not disclose that if the user performs no operation for the digital camera for a predetermined first period of time or more, the display is turned off, under control of the control means.

Anderson '436 discloses a digital camera with the ability to automatically place the digital camera in a sleep mode during the interval when the camera is inactive, column 2, line 63.

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The sleep mode minimizes power consumption during inactive periods. A user can use a camera for a longer time if sleep mode is available.

Therefore, it would be obvious to one skilled in the art to implement Anderson '436 teaching into Tamura '896 in view of Sobol '035 and further view of Sato '704 to put the camera in sleep mode, which turns off the display if no operation is performed by a user after a set time. A user can use a camera for a longer time if sleep mode is available.

With reference to claim 17, Tamura '896 in view of Sobol '035 and further view of Sato '704 discloses that a display is performed for an image, which is to be printed, or which is a candidate to be printed, on the predetermined display unit of the digital camera. But Tamura '896 does not disclose that the user performs no operation for the digital camera for a predetermined second period of time or more, the display is turned off, under control of the control means.

Anderson '436 discloses a digital camera with the ability to automatically place the digital camera in a sleep mode during the interval when the camera is inactive, column 2, line 63. The sleep mode minimizes power consumption during inactive periods. A user can use a camera for a longer time if sleep mode is available.

Therefore, it would be obvious to one skilled in the art to implement Anderson '436 teaching into Tamura '896 invention in view of Sobol '035 and further view of Sato '704 to put the camera in sleep mode, which turns off the display if no operation is performed by a user after a set time. A user can use a camera for a longer time if sleep mode is available.

With reference to claim 18, Tamura '896 in view of Sobol '035 and further view of Sato '704 discloses that a display is perform for an image which is to be printed on the display unit of the digital camera (see Tamura '896, fig. 9). But Tamura '896 did not disclose that in the event the secondary battery is not being presently charged, the display is turned off, and on the other hand, in the event that the secondary battery is being presently charged, the display is automatically switched to a display for notifying the state of the secondary battery, and furthermore, in the event that the display is performed for notifying the state of the secondary battery due to the switching, and the user performs no operation for the digital camera for a predetermined first period of time or more, the display is turned off, under control of the control means.

Anderson '436 discloses a digital camera with the ability to automatically place the digital camera in a sleep mode during the interval when the camera is inactive, column 2, line 63. This sleep mode is performed in the event of battery not being charged, and in the event battery being charged and display for notifying the state the battery and user performs no operation for the digital camera, as described above in claim 7-8. The sleep mode minimizes power consumption during inactive periods. A user can use a camera for a longer time if sleep mode if available.

Therefore, It would be obvious to one skill in the art to implement Anderson '436 teaching into Tamura '896 invention in view of Sobol '035 and further view of Sato '704 to put the camera in sleep mode, which turns off the display if no operation is perform by a user after a set time. A user can use a camera for a longer time if sleep mode if available.

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With reference to claim 25, Tamura '896 in view of Sobol '035 and further view of Sato '704 discloses a display performed for notify the state of secondary battery, as described above in claim 6, but Tamura '896 did not discloses that if the user performs no operation for the digital camera for a predetermined first period of time or more, the display is turned off, under control of the control means.

Anderson '436 discloses a digital camera with the ability to automatically place the digital camera in a sleep mode during the interval when the camera is inactive, column 2, line 63. The sleep mode minimizes power consumption during inactive periods. A user can use a camera for a longer time if sleep mode if available.

Therefore, it would be obvious to one skill in the art to implement Anderson '436 teaching into Tamura '896 invention in view of Sobol '035 and further view of Sato '704 to put the camera in sleep mode, which turns off the display if no operation is perform by a user after a set time. A user can use a camera for a longer time if sleep mode if available.

With reference to claim 26, Tamura '896 in view of Sobol '035 and further view of Sato '704 discloses that a display is performed for an image, which is to be printed, or which is a candidate to be printed, on the predetermined display unit of the digital camera. But Tamura '896 does not disclose that the user performs no operation for the digital camera for a predetermined second period of time or more, the display is turned off, under control of the control means.

Anderson '436 discloses a digital camera with the ability to automatically place the digital camera in a sleep mode during the interval when the camera is inactive, column 2, line 63.

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The sleep mode minimizes power consumption during inactive periods. A user can use a camera for a longer time if sleep mode is available.

Therefore, it would be obvious to one skilled in the art to implement Anderson '436 teaching into Tamura '896 invention in view of Sobol '035 and further view of Sato '704 to put the camera in sleep mode, which turns off the display if no operation is performed by a user after a set time. A user can use a camera for a longer time if sleep mode is available.

With reference to claim 27, Tamura '896 in view of Sobol '035 and further view of Sato '704 discloses that a display is performed for an image which is to be printed on the display unit of the digital camera (see Tamura '896, fig. 9). But Tamura '896 did not disclose that in the event the secondary battery is not being presently charged, the display is turned off, and on the other hand, in the event that the secondary battery is being presently charged, the display is automatically switched to a display for notifying the state of the secondary battery, and furthermore, in the event that the display is performed for notifying the state of the secondary battery due to the switching, and the user performs no operation for the digital camera for a predetermined first period of time or more, the display is turned off, under control of the control means.

Anderson '436 discloses a digital camera with the ability to automatically place the digital camera in a sleep mode during the interval when the camera is inactive, column 2, line 63. This sleep mode is performed in the event of battery not being charged, and in the event battery being charged and display for notifying the state of the battery and user performs no operation for the digital camera, as described above in claim 7-8. The sleep mode minimizes power

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consumption during inactive periods. A user can use a camera for a longer time if sleep mode is available.

Therefore, it would be obvious to one skill in the art to implement Anderson '436 teaching into Tamura '896 invention Tamura '896 in view of Sobol '035 and further view of Sato '704 to put the camera in sleep mode, which turns off the display if no operation is performed by a user after a set time. A user can use a camera for a longer time if sleep mode is available.

Claim(s) 10, 19, 28 are rejected under 35 U.S.C. 103(a) as being unpatentable over Tamura et al US6771896 in view of Sobol US 20020071035 in further view of Konishi et al 20020003576.

With reference to claim 10, Tamura '896 in view of Sobol '035 discloses a digital camera secondary battery receiving electrical power from printer as described above in claim 1, but he does not disclose upon completion of charging display unit notify the completion of charging.

Konishi '576 discloses Fig. 19A shows a display example when the battery is fully charged, column 8, paragraph 120. Completion of charging notification will enable a user to know that battery is fully charged and he no need to further charge it. It will help a user not to keep charging battery, after being fully charged, which can harm the battery and camera.

Therefore, it would be obvious to one skill in the art to implement Konishi '576 teaching in view of Sobol '035 into Tamura '896 invention for displaying the notification of completion of charging. It will help a user not to keep charging battery, after being fully charged, which can harm the battery and camera.

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With reference to claim 19, Tamura '896 in view of Sobol '035 discloses a digital camera secondary battery receiving electrical power from printer as described above in claim 1, but he does not disclose upon completion of charging display unit notify the completion of charging.

Konishi '576 discloses Fig. 19A shows a display example when the battery is fully charged, column 8, paragraph 120. Completion of charging notification will enable a user to know that battery is fully charged and he no need to further charged it. It will help a user not to keep charging battery, after being fully charged, which can harm the battery and camera.

Therefore, it would be obvious to one skill in the art to implement Konishi '576 teaching in view of Sobol '035 into Tamura '896 invention for displaying the notification of completion of charging. It will help a user not to keep charging battery, after being fully charged, which can harm the battery and camera.

With reference to claim 28, Tamura '896 in view of Sobol '035 discloses a digital camera secondary battery receiving electrical power from printer as described above in claim 1, but he does not disclose upon completion of charging display unit notify the completion of charging.

Konishi '576 discloses Fig. 19A shows a display example when the battery is fully charged, column 8, paragraph 120. Completion of charging notification will enable a user to know that battery is fully charged and he no need to further charged it. It will help a user not to keep charging battery, after being fully charged, which can harm the battery and camera.

Therefore, it would be obvious to one skill in the art to implement Konishi '576 teaching in view of Sobol '035 into Tamura '896 invention for displaying the notification of completion

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of charging. It will help a user not to keep charging battery, after being fully charged, which can harm the battery and camera.

Claim(s) 30-31 are rejected under 35 U.S.C. 103(a) as being unpatentable over Tamura et al US6771896 in view of Sobol US 20020071035 in further view of Hosono US 4332445.

With reference to claim 30, Tamura '896 in view of Sobol '035 recites what was previously discussed in claim 11 except that the charging circuit has a configuration wherein charging of the secondary battery employed therein is stopped during a period in time of the thermal head of the printer being driven, under control of the control means thereof and the control means of the printer, communicating with each other.

Hosono '445 disclose a charging stop switch in the camera in addition to a power switch so that the charging of the capacitor for the flash light tube may be stopped while the additional electrically operated device such as a data-printing device is electrically operated, column 2, line 15. The thermal head of the printer being drive is same as additional electrically operated device such as a data-printing device is electrically operated. It will allow the printer to being charged while printing since it needs more power while printing.

Therefore, it would have been obvious to one skill in the art to implement Hosono '445 teaching into Tamura '896 invention in view of Sobol '035 to stop charging the camera secondary battery if thermal head of the printer is being driven because it will allow the printer to being charged while printing since it needs more power while printing.

With reference to claim 31, claim 31 recites what was previously discussed in claim 30.

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4. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Asif Khokhar whose telephone number is (571) 270-3221. The examiner can normally be reached on Monday- Friday 7:30am-5pm EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Tuan Ho can be reached on 571 272 7365. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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